REMARKS

Entry of the foregoing amendment is respectfully requested prior to examination of the application.

Applicants respectfully note that, upon entry of the present amendment, claims 1, 8, 9 and 14 will be amended to clarify their language, and claims 21-29 will be added. In this regard, Applicants note that the present amendment is being presented to even more clearly recite Applicants' invention by placing the claimed subject matter even more in accordance with standard U.S. practice and idiomatic English, and is not intended to be a narrowing amendment.

Should there be any questions, the Examiner is invited to contact the undersigned at the below listed number.

Respectfully submitted,
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APPENDIX
MARKED-UP COPY OF SPECIFICATION AMENDMENT

Marked-up copy of paragraph appearing at page 12, lines 19-27:

The lithium manganese oxide intercalation compounds prepared by the process according to the invention have the morphology [described in claim 1] wherein the lithium intercalation compound has a specific surface area, determined by the BET method, of from 0.3 to 5 m^2/g, a particle size, determined from the d_{50} value, of greater than 0.5 μm, a diameter, determined from the d_{90} value, of 30 μm or less, and an internal pore volume of less than 0.05 ml/g and has a pronounced crystal structure. They can advantageously be used for the production of particularly thin thin-film electrodes. Secondary lithium ion batteries which contain the lithium manganese oxide spinels according to the invention as active material of the positive electrode are particularly suitable as high-performance batteries.

MARKED-UP COPY OF AMENDED CLAIMS 1, 8, 9 AND 14

1. (Amended) A lithium intercalation compound containing lithium manganese oxide and having a spinel structure for thin-film electrodes, [where the] said lithium intercalation compound [has] comprising:

- a specific surface area, determined by the BET method, of from 0.3 to 5 m^2/g,
- a particle size, determined from the d_{50} value, of greater than 0.5 μm, and
- a diameter, determined from the d_{90} value, of 30 μm or less, and an internal pore volume of less than 0.05 ml/g and has a pronounced crystal structure.

8. (Amended) A process for the preparation of a lithium intercalation compound containing lithium manganese oxide and having a spinel structure as claimed in claim 1, by

a) preparation of an intimate mixture of [one or more] at least one lithium [compounds] compound and [one or more] at least one manganese [compounds] compound, where at least one of these compounds or the sum of all compounds contains sufficient active oxygen that the number of equivalents of active oxygen is equal to or greater than the number of lithium atoms, and heating at from 600°C to 1000°C in a non-oxidizing atmosphere, followed by grinding, giving a particulate, crystalline spinel precursor compound; and

b) heating the crystalline spinel precursor compound in an oxidizing atmosphere at from 500°C to 800°C with a residence time of from 0.5 to 10 hours.

9. (Amended) A process for the preparation of a lithium intercalation compound containing lithium manganese oxide and having a spinel structure as claimed in claim 1, by

a) a1) preparation of an intimate mixture of Li_2O_3 and Mn_3O_4,

a2) heating at from 600°C to 1000°C under [nitrogen, argon or another] a non-oxidizing atmosphere with a residence time of from 15 to 120 minutes in a rotary tube furnace,

a3) grinding the heated mixture to give a particulate, crystalline precursor compound; and

b) heating of the spinel precursor compound in an oxidizing atmosphere at from 500°C to 800°C with a residence time of from 0.5 to 10 hours.

14. (Amended) A process as claimed in claim 8, where, after the heating in an oxidizing atmosphere, the resultant solid is suspended in water with addition of [one or more] at least one alkaline lithium [compounds] compound, and the suspension is spray-dried at a temperature of from 100°C to 400°C.